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Search Results -

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JPO Abstracts Database
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IBM Technical Disclosure Bulletins

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DATE: Saturday, August 14, 2004 Printable Copy Create Case

Set Name Query side by side Hit Count Set Name result set

DB=EPAB,JPAB,DWPI,TDBD; THES=ASSIGNEE; PLUR=YES; OP=OR

<u>L5</u>	L4 and search\$	7	<u>L5</u>
<u>L4</u>	L2 and ((calculat\$ or determin\$) with distance)	31	<u>L4</u>
<u>L3</u>	L2 and ("point-of-interest" or "point of interest")	0	<u>L3</u>

L1 and route and map\$ and destination 414 L2
L1 vehicle and navigation and (poi or point\$ or exit) 3194 L1

END OF SEARCH HISTORY

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L5: Entry 1 of 7

File: JPAB

Aug 6, 1999

PUB-NO: JP411213283A

DOCUMENT-IDENTIFIER: JP 11213283 A

TITLE: NAVIGATION DEVICE

PUBN-DATE: August 6, 1999

INVENTOR-INFORMATION:

NAME

COUNTRY

MATSUMURA, KAZUMASA

ASSIGNEE-INFORMATION:

NAME

COUNTRY

FUJITSU TEN LTD

APPL-NO: JP10015863

APPL-DATE: January 28, 1998

INT-CL (IPC): G08 G 1/00; G01 C 21/00; G01 S 13/93; G01 S 17/93; G08 G 1/0969

ABSTRACT:

PROBLEM TO BE SOLVED: To perform the <u>search</u> of an appropriate <u>route</u> or the like by stored information by detecting and storing the position of an obstacle where a <u>vehicle</u> can not pass through.

SOLUTION: Whether or not obstacle signals are detected by a radar device 9 is judged, and at the time of judging that the obstacle is present, a <u>distance</u> to the obstacle is computed from signals from the radar device 9 and the position of the obstacle on a <u>map</u> is computed based on a <u>vehicle</u> position at the present <u>point</u> of time decided from the signals from a GPS device, a car speed sensor and a bearing sensor, the <u>calculated distance</u> L to the obstacle and bearing data from the bearing sensor. The computed position of the obstacle is stored in a storage part 6 and whether or not the obstacle is present on a traveling <u>route to a destination</u> searched by this <u>navigation</u> device is judged from the calculated position of the obstacle. Then, at the time of judging that it is on the <u>route</u>, alarm signals are outputted to an acoustic device 10, alarm sound is generated and an alarm is displayed at a display part 8 simultaneously.

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L5: Entry 2 of 7

File: EPAB

Jan 2, 1997

PUB-NO: EP000751376A2

DOCUMENT-IDENTIFIER: EP 751376 A2 TITLE: Vehicular <u>navigation</u> apparatus

PUBN-DATE: January 2, 1997

INVENTOR-INFORMATION:

NAME COUNTRY

HAYASIDA, KIHACHI JP YANAGIKUBO, TAKESHI JP

ASSIGNEE-INFORMATION:

NAME COUNTRY

AISIN AW CO JP

APPL-NO: EP96110401

APPL-DATE: June 27, 1996

PRIORITY-DATA: JP16167995A (June 28, 1995)

INT-CL (IPC): $\underline{G01}$ \underline{C} $\underline{21/20}$ EUR-CL (EPC): $\underline{G01C021/34}$

ABSTRACT:

CHG DATE=19990617 STATUS=0> A <u>navigation</u> apparatus has: a current position detecting device for detecting current position of a <u>vehicle</u> in which the device is installed; an information storing device for storing <u>map</u> information and other <u>route</u> information for <u>route search and route</u> guidance; an input device for inputting instructions; an output device for outputting information for <u>route</u> guidance; and a central processing device. The central processing device has <u>route searching means for searching for a route</u> from the current position to a <u>destination</u> or a passing <u>point</u> on the basis of the <u>map</u> information, <u>route</u> storing means for temporarily storing the <u>route</u> found by the <u>route searching means</u>, and <u>route</u> guidance control means for outputting to the output device a signal for executing <u>route</u> guidance based on the <u>route</u>. The apparatus <u>determines</u> a location on a road located a predetermined <u>distance</u> ahead in the travel direction from the current position, as a <u>search</u> starting location or as a <u>route</u> guidance starting

location.

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L5: Entry 3 of 7 File: EPAB Mar 20, 1996

PUB-NO: EP000702209A1

DOCUMENT-IDENTIFIER: EP 702209 A1 TITLE: Vehicular navigation system

PUBN-DATE: March 20, 1996

INVENTOR-INFORMATION:

NAME COUNTRY

NIMURA, MITUSHIRO JP
NANBA, AKIMASA JP
MAEKAWA, KAZUTERU JP

ASSIGNEE-INFORMATION:

NAME COUNTRY

AISIN AW CO JP

APPL-NO: EP95114237

APPL-DATE: September 11, 1995

PRIORITY-DATA: JP24729394A (September 14, 1994), JP26458494A (October 3, 1994)

INT-CL (IPC): G01 C 21/20 EUR-CL (EPC): G01C021/34

ABSTRACT:

CHG DATE=19990617 STATUS=0> A vehicular <u>navigation</u> system includes a central control unit which determines when a present position deviates from a <u>searched route</u> along which guidance is being provided from a starting <u>point to a destination</u> and determines whether or not the detected deviating present position is on a guidable road prior to re<u>searching the route</u> and providing guidance based upon the re<u>searched route</u>. A guidable road is a road upon which the <u>navigation</u> system contains sufficient <u>map</u> information and guide information for the <u>navigation</u> system to <u>search a route</u> and provide guidance. Additionally, system <u>determines</u> whether the <u>vehicle</u> has traveled a predetermined <u>distance</u> after re<u>search of the route</u> prior to providing travel guidance based upon the re<u>searched route</u>. Otherwise travel guidance continues to be provided based upon the previously <u>searched route</u>. A driver, after making a short deviation, may thus return to the previous route

without travel guidance being interrupted by a re-searched route.

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L5: Entry 4 of 7

File: DWPI

Jul 6, 2001

DERWENT-ACC-NO: 2002-181671

DERWENT-WEEK: 200224

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TITLE: Route display method for <u>vehicle navigation</u> device, involves <u>determining</u> <u>distance of route</u> from starting <u>point to destination</u> and displaying <u>route map</u> with linked external data stored in compact flash memory

PATENT-ASSIGNEE: ENPEX KISHOKEI KK (ENPEN)

PRIORITY-DATA: 1999JP-0365394 (December 22, 1999)

Search Selected Search ALL Clear

PATENT-FAMILY:

PUB-NO

PUB-DATE

LANGUAGE

PAGES

MATN-TPC

JP 2001183152 A

July 6, 2001

016

G01C021/00

APPLICATION-DATA:

PUB-NO

APPL-DATE

APPL-NO

DESCRIPTOR

JP2001183152A

December 22, 1999

1999JP-0365394

INT-CL (IPC): $\underline{G01}$ \underline{C} $\underline{21/00}$; $\underline{G01}$ \underline{S} $\underline{5/14}$; $\underline{G06}$ \underline{F} $\underline{17/30}$; $\underline{G08}$ \underline{G} $\underline{1/0969}$; $\underline{G09}$ \underline{B} $\underline{29/10}$; $\underline{H04}$ \underline{B} $\underline{7/26}$; $\underline{H04}$ \underline{Q} $\underline{7/38}$

ABSTRACTED-PUB-NO: JP2001183152A

BASIC-ABSTRACT:

NOVELTY - The present position of <u>vehicle</u> in external <u>map</u> data is <u>searched</u> in a folder based on input global positioning system (GPS) signal based on which <u>distance of route</u> from the starting <u>point to the destination is determined and route map</u> is displayed, along with external data stored in compact flash memory.

DETAILED DESCRIPTION - An INDEPENDENT CLAIM is also included for navigation device.

USE - For displaying <u>route</u> along with external <u>map</u> data such as weather information, companion position in <u>vehicle navigation</u> device (claimed).

ADVANTAGE - The external data is also utilized for $\underline{\text{route search}}$ display. Hence efficiency is improved.

DESCRIPTION OF DRAWING(S) - The figure shows the flowchart explaining method of displaying <u>route in navigation</u> device. (Drawing includes non-English language text).

ABSTRACTED-PUB-NO: JP2001183152A

EQUIVALENT-ABSTRACTS:

CHOSEN-DRAWING: Dwg.1/10

DERWENT-CLASS: P85 S02 T01 W01 W06 X22

EPI-CODES: S02-B08C; S02-B08E; S02-K04C; T01-J07D3A; W01-C05B5C; W06-A08; X22-E06B;

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File: DWPI

Apr 20, 2001

DERWENT-ACC-NO: 2001-505217

DERWENT-WEEK: 200156

L5: Entry 5 of 7

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TITLE: Route planning apparatus for motor $\underline{\text{vehicles}}$, displays $\underline{\text{route}}$ such that starting and terminus $\underline{\text{points of route}}$ are connected by lines through arbitrary

relay points

PATENT-ASSIGNEE: MARUCHI SYSTEMS KK (MARUN)

PRIORITY-DATA: 1999JP-0289118 (October 12, 1999)

Search Selected Search ALL Clear

PATENT-FAMILY:

PUB-NO PUB-DATE LANGUAGE PAGES MAIN-IPC

<u>JP 2001108456 A</u> April 20, 2001 013 G01C021/00

APPLICATION-DATA:

PUB-NO APPL-DATE APPL-NO DESCRIPTOR

JP2001108456A October 12, 1999 1999JP-0289118

INT-CL (IPC): G01 C 21/00; G06 F 17/30; G08 G 1/0969; G09 B 29/00; G09 B 29/10

ABSTRACTED-PUB-NO: JP2001108456A

BASIC-ABSTRACT:

NOVELTY - The <u>route</u> planning apparatus <u>searches map</u> data stored beforehand, for the <u>route</u> which connects arbitrary starting and terminus <u>points</u>. A <u>route</u> display unit (3) displays the <u>route</u>, such that starting <u>point</u> and terminus <u>point</u> of the <u>route</u> are connected by lines through arbitrary relay points.

DETAILED DESCRIPTION - A <u>route calculation</u> unit computes the direction and the <u>distance of route</u> which connects starting and terminus <u>points</u> through arbitrary <u>points</u> based on co-ordinate data. A <u>route</u> patterning unit <u>points</u> the computed <u>route</u> on the display unit, at predetermined rate of a contraction scale. INDEPENDENT CLAIMS are also included for the following:

- (a) Route planning procedure;
- (b) Memory medium storing route planning program

USE - Route planning apparatus of navigation apparatus mounted in motor vehicle.

ADVANTAGE - Sets short distance path between starting <u>point to destination</u> through relay <u>point</u> easily.

DESCRIPTION OF DRAWING(S) - The figure shows the block diagram of $\underline{\text{route}}$ planning apparatus. (The drawing includes non-English language text).

Route display unit 3

ABSTRACTED-PUB-NO: JP2001108456A

EQUIVALENT-ABSTRACTS:

CHOSEN-DRAWING: Dwg.2/12

DERWENT-CLASS: P85 S02 T01 T07 X22

EPI-CODES: S02-B08; T01-J06B; T07-A05C; X22-E06;

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Generate Collection Print

L5: Entry 6 of 7 File: DWPI Oct 27, 2003

DERWENT-ACC-NO: 1996-428499

DERWENT-WEEK: 200373

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TITLE: <u>Vehicle navigation</u> appts - has path guiding unit which guides <u>vehicle</u> in correct path between starting and <u>destination points</u> based on transit position of

vehicle and map information from memory

PATENT-ASSIGNEE: MATSUSHITA DENKI SANGYO KK (MATU)

PRIORITY-DATA: 1995JP-0019145 (February 7, 1995)

Search Selected Search ALL Clear

PATENT-FAMILY:

PUB-NO	PUB-DATE	LANGUAGE	PAGES	MAIN-IPC
JP 3460033 B2	October 27, 2003	•	014	G01C021/00
JP 08210864 A	August 20, 1996		015	G01C021/00

APPLICATION-DATA:

PUB-NO	APPL-DATE	APPL-NO	DESCRIPTOR
JP 3460033B2	February 7, 1995	1995JP-0019145	
JP 3460033B2		JP 8210864	Previous Publ.
JP 08210864A	February 7, 1995	1995JP-0019145	

INT-CL (IPC): G01 C 21/00; G08 G 1/0969; G09 B 29/10

ABSTRACTED-PUB-NO: JP 08210864A

BASIC-ABSTRACT:

The appts has a bearing sensor (201), a transit <u>distance</u> sensor (202) and an absolute position detector (203) from which the direction, the transit <u>distance</u> and the present position of a <u>vehicle</u> are <u>calculated</u>. The information signal is given to a dead reckoning navigator (205) which determines the transit position of the <u>vehicle</u> using a road information and a geographic information from a memory (204). The transit locus along with the <u>map</u> data from the memory are displayed in a display unit (211). The starting <u>point of the vehicle</u> and the input operation of the <u>destination point</u> are given to a <u>point</u> setting unit (207) through an input unit (206), which sets the correct <u>destination point</u> based on the transit position of the <u>vehicle</u>.

A path planning unit (208) determines the correct path between the starting <u>point</u> and the <u>destination</u> point and the <u>route</u> is stored in a memory (209). Based on the <u>route</u> information, a path guiding unit (210) guides the <u>vehicle</u> to move in the correct path from the starting <u>point</u> to the <u>destination</u> point. If the <u>vehicle</u> goes beyond the calculated path, then the return path from the <u>destination</u> is to be

determined. The memory stores the return path of the $\underline{\text{vehicle}}$ and based on this information, the path guiding unit guides the $\underline{\text{vehicle}}$ to follow the return path. Thus, the $\underline{\text{vehicle}}$ is guided along the correct path.

ADVANTAGE - Shortens <u>searching</u> time of <u>vehicle</u> return path. Starts path guiding unit quickly. Resumes path guidance when power supply is switched OFF.

ABSTRACTED-PUB-NO: JP 08210864A

EQUIVALENT-ABSTRACTS:

CHOSEN-DRAWING: Dwg.2/8

DERWENT-CLASS: P85 S02 W06 X22

EPI-CODES: S02-B08; W06-A03A; W06-A04A1; W06-A04H1; X22-E06D;

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L5: Entry 7 of 7 File: DWPI Mar 20, 1996

DERWENT-ACC-NO: 1996-152783

DERWENT-WEEK: 200256

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TITLE: <u>Navigation</u> system esp. for motor <u>vehicle</u> with automatic <u>route</u> re<u>-search on route</u> deviation - when current position deviates from <u>searched route</u>, <u>determines</u> whether <u>vehicle</u> has travelled predetermined <u>distance</u> after re<u>-searching</u>, where travel guidance is based on re<u>-searched route</u>, or otherwise based on previously searched route

INVENTOR: MAEKAWA, K; NANBA, A; NIMURA, M

PATENT-ASSIGNEE: AISIN AW CO LTD (AISW)

PRIORITY-DATA: 1994JP-0264584 (October 3, 1994), 1994JP-0247293 (September 14,

1994)

		Search Selected	Search ALL	Clear	
PATE	ENT-FAMILY:				
	PUB-NO	PUB-DATE	LANGUAGE	PAGES	MAIN-IPC
	EP 702209 A1	March 20, 1996	E	031	G01C021/20
	DE 69527121 E	July 25, 2002.		000	G01C021/20
	<u>JP 08086659 A</u>	April 2, 1996		010	G01C021/00
	<u>JP 08105754 A</u>	April 23, 1996		013	G01C021/00
	<u>US 5757289 A</u>	May 26, 1998		000	G08G001/123
	JP 3171029 B2	May 28, 2001		013	G01C021/00
	EP 702209 B1	June 19, 2002	E	000	G01C021/20

DESIGNATED-STATES: DE FR GB IT DE FR GB IT

CITED-DOCUMENTS: DE 4226230; EP 583773 ; US 5303159 ; US 5311434

APPLICATION-DATA:

PUB-NO	APPL-DATE	APPL-NO	DESCRIPTOR
EP 702209A1	September 11, 1995	1995EP-0114237	
DE 69527121E	September 11, 1995	1995DE-0627121	
DE 69527121E	September 11, 1995	1995EP-0114237	
DE 69527121E		EP 702209	Based on
JP 08086659A	September 14, 1994	1994JP-0247293	
JP 08105754A	October 3, 1994	1994JP-0264584	

US 5757289A June 6, 1995 1995US-0466193

JP 3171029B2 October 3, 1994 1994JP-0264584
JP 3171029B2 JP 8105754 Previous Publ.

EP 702209B1 September 11, 1995 1995EP-0114237

INT-CL (IPC): G01 C 21/00; G01 C 21/20; G08 G 1/0969; G08 G 1/123; G09 B 29/10

ABSTRACTED-PUB-NO: EP 702209A

BASIC-ABSTRACT:

The <u>navigations</u> system has a central control section (4) with a <u>route</u> calculating portion which determines the current position and calculates a <u>route to the destination</u>. The current position is determined by a CPU on the basis of GPS information, <u>map</u> information and <u>vehicle</u> sensors in a detecting section (2). A <u>route</u> guidance control portion outputs <u>route</u> data via an input/output section (1) when requested by the user.

The control unit determines when the current position deviates from a searched
route along which the guidance is being provided from a starting point to a destination, and determines whether or not the position is on a guidable i.e. map-trackable road prior to re-searching the route, when it the provides guidance based on the re-searched route. If the vehicle has not travelled a predetermined distance after re-searching the route, the travel guidance remains that based on the previously searched route. The driver, after making a short deviation, may return to previous route without interruption of travel guidance by a re-searched route.

ADVANTAGE - Is capable of re-searching route using limited map data, i.e. which does not cover un-guidable minor roads, without confusing driver.

ABSTRACTED-PUB-NO: EP 702209B

EQUIVALENT-ABSTRACTS:

The <u>navigations</u> system has a central control section (4) with a <u>route</u> calculating portion which determines the current position and calculates a <u>route to the destination</u>. The current position is determined by a CPU on the basis of GPS information, <u>map</u> information and <u>vehicle</u> sensors in a detecting section (2). A <u>route</u> guidance control portion outputs <u>route</u> data via an input/output section (1) when requested by the user.

The control unit determines when the current position deviates from a searched
route along which the guidance is being provided from a starting point to a
destination, and determines whether or not the position is on a guidable i.e. map-trackable
road prior to re-searching the route, when it the provides guidance based on the re-searched route. If the weblide has not travelled a predetermined distance after re-searching the route, the travel guidance remains that based on the previously searched route. The driver, after may return to previous route without interruption of travel guidance by a re-searched route.

ADVANTAGE - Is capable of re-searching route using limited map data, i.e. which does not cover un-guidable minor roads, without confusing driver.

US 5757289A

The <u>navigations</u> system has a central control section (4) with a <u>route</u> calculating portion which determines the current position and calculates a <u>route to the destination</u>. The current position is determined by a CPU on the basis of GPS

information, <u>map</u> information and <u>vehicle</u> sensors in a detecting section (2). A <u>route</u> guidance control portion outputs <u>route</u> data via an input/output section (1) when requested by the user.

The control unit determines when the current position deviates from a searched
route along which the guidance is being provided from a starting point to a
destination, and determines whether or not the position is on a guidable i.e. map-trackable
road prior to re-searching the route, when it the provides guidance based on the re-searched route. If the vehicle
has not travelled a predetermined distance
after re-searching the route, the travel guidance remains that based on the
previously searched route
. The driver, after making a short deviation, may return
to previous route
without interruption of travel guidance by a re-searched route.

ADVANTAGE - Is capable of re<u>searching route</u> using limited <u>map</u> data, i.e. which does not cover un-guidable minor roads, without confusing driver.

CHOSEN-DRAWING: Dwg.1/29

DERWENT-CLASS: S02 T01 T07 W06 X22

EPI-CODES: S02-B08; T01-J06B; T07-A05C; W06-A03A; W06-A08; X22-E06D;

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Search Results - Record(s) 1 through 7 of 7 returned.

1. Document ID: JP 11213283 A

Using default format because multiple data bases are involved.

L5: Entry 1 of 7

File: JPAB

Aug 6, 1999

PUB-NO: JP411213283A

DOCUMENT-IDENTIFIER: JP 11213283 A

TITLE: NAVIGATION DEVICE

PUBN-DATE: August 6, 1999

INVENTOR-INFORMATION:

NAME

COUNTRY

MATSUMURA, KAZUMASA

INT-CL (IPC): $\underline{G08} \ \underline{G} \ \underline{1/00}; \ \underline{G01} \ \underline{C} \ \underline{21/00}; \ \underline{G01} \ \underline{S} \ \underline{13/93}; \ \underline{G01} \ \underline{S} \ \underline{17/93}; \ \underline{G08} \ \underline{G} \ \underline{1/0969}$

Full | Title | Citation | Front | Review | Classification | Date | Reference | Claims | KOMC | Draw Do

File: EPAB

PUB-NO: EP000751376A2

L5: Entry 2 of 7

DOCUMENT-IDENTIFIER: EP 751376 A2 TITLE: Vehicular <u>navigation</u> apparatus

3. Document ID: EP 702209 A1

L5: Entry 3 of 7

File: EPAB

Mar 20, 1996

Jan 2, 1997

PUB-NO: EP000702209A1

DOCUMENT-IDENTIFIER: EP 702209 A1 TITLE: Vehicular navigation system

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4. Document ID: JP 2001183152 A

L5: Entry 4 of 7

File: DWPI

Jul 6, 2001

DERWENT-ACC-NO: 2002-181671

DERWENT-WEEK: 200224

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TITLE: Route display method for <u>vehicle navigation</u> device, involves <u>determining</u> <u>distance of route</u> from starting <u>point to destination</u> and displaying <u>route map</u> with linked external data stored in compact flash memory

Full	Title Citation Front	Review Classification Da	te Reference		Claims K	WAC Draws De
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	5. Document ID:	JP 2001108456 A				
L5:	Entry 5 of 7	File	DWPI	7	Apr 20,	2001

DERWENT-ACC-NO: 2001-505217

DERWENT-WEEK: 200156

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TITLE: Route planning apparatus for motor $\frac{\text{vehicles}}{\text{connected}}$ displays $\frac{\text{route}}{\text{such}}$ such that starting and terminus $\frac{\text{points of route}}{\text{otherwise}}$ are connected by lines through arbitrary relay points

Full	Title Citation Front	Review Classification	Date Reference		Claims I	KuwiC - Drawn De
	6. Document ID:	JP 3460033 B2, J	P 08210864 A	L		
L5:	Entry 6 of 7	Fil	le: DWPI		Oct 27,	2003

DERWENT-ACC-NO: 1996-428499

DERWENT-WEEK: 200373

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TITLE: <u>Vehicle navigation</u> appts - has path guiding unit which guides <u>vehicle</u> in correct path between starting and <u>destination points</u> based on transit position of <u>vehicle and map</u> information from memory

Full Title Citation Front Review	Classification Date Reference	Claims KMC Draw
7. Document ID: EP 702	•	3086659 А, JP 08105754 A, US
5757289 A, JP 3171029 B2, EP	702209 B1	
L5: Entry 7 of 7	File: DWPI	Mar 20, 1996

DERWENT-ACC-NO: 1996-152783

DERWENT-WEEK: 200256

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TITLE: Navigation system esp. for motor vehicle with automatic route re-search on

h eb b g ee ef e c ef b e

route deviation - when current position deviates from <u>searched route</u>, <u>determines</u> whether <u>vehicle</u> has travelled predetermined <u>distance</u> after re-<u>searching</u>, where travel guidance is based on re-<u>searched route</u>, or otherwise based on previously searched route

Full Title Citation Front Review Cl	lassification Date Reference	Claims KMC Draw De
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Terms	Documents	
L4 and search\$		7

Display Format: - Change Format

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Generate OACS

Search Results - Record(s) 1 through 10 of 31 returned.

1. Document ID: JP 2002213972 A

Using default format because multiple data bases are involved.

L4: Entry 1 of 31

File: JPAB

Jul 31, 2002

Feb 25, 2000

PUB-NO: JP02002213972A

DOCUMENT-IDENTIFIER: JP 2002213972 A

TITLE: NAVIGATION DEVICE

PUBN-DATE: July 31, 2002

INVENTOR-INFORMATION:

NAME COUNTRY

YABU, TOSHIHIDE

INT-CL (IPC): G01 C 21/00; G08 G 1/0969; G09 B 29/10; H04 B 7/26

Full | Title | Citation | Front | Review | Classification | Date | Reference | Classification | Date | Dat

File: JPAB

PUB-NO: JP02000055688A

L4: Entry 2 of 31

DOCUMENT-IDENTIFIER: JP 2000055688 A TITLE: ON-VEHICLE NAVIGATION DEVICE

Full Title Citation Front Review Classification Date Reference Claims KMC Draw De

3. Document ID: JP 11271083 A

L4: Entry 3 of 31 File: JPAB Oct 5, 1999

PUB-NO: JP411271083A

DOCUMENT-IDENTIFIER: JP 11271083 A

TITLE: NAVIGATION METHOD

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4. Document ID: JP 11213283 A

L4: Entry 4 of 31

File: JPAB

Aug 6, 1999

PUB-NO: JP411213283A

DOCUMENT-IDENTIFIER: JP 11213283 A

TITLE: NAVIGATION DEVICE

Full Title Citation Front Review Classificatio	n Date Reference	Claims ROMC Draw De
5. Document ID: EP 751376 A2		
L4: Entry 5 of 31	File: EPAB	Jan 2, 1997

PUB-NO: EP000751376A2

DOCUMENT-IDENTIFIER: EP 751376 A2 TITLE: Vehicular <u>navigation</u> apparatus

Full Title Citation Front Review Classification	n Date Reference	Claims 1000C Draw De
6. Document ID: EP 702209 A1		
L4: Entry 6 of 31	File: EPAB	Mar 20, 1996

PUB-NO: EP000702209A1

DOCUMENT-IDENTIFIER: EP 702209 A1 TITLE: Vehicular <u>navigation</u> system

Full	Title	Citation Front	Review	Classification	Date	Reference		Claims	Draw De
			***************************************	***************************************		***************************************	***************************************	 	
	7.	Document ID	JP 200	02310703 <i>A</i>	A				

File: DWPI

DERWENT-ACC-NO: 2003-007433

L4: Entry 7 of 31

DERWENT-WEEK: 200305

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TITLE: Reset announcement apparatus for $\underline{\text{navigation}}$ system, acquires geographical special feature corresponding to reset original $\underline{\text{route}}$, corresponding to which message is produced and announced

Full	Title	Citation Front	Review Classi	rication Date	Reference		0	laims		Draw De
 П	8	Document ID:							,,,,,,,,,,	

8. Document ID: EP 1380021 A1, DE 10117395 A1, WO 200282404 A1

L4: Entry 8 of 31

File: DWPI

Jan 14, 2004

Oct 23, 2002

DERWENT-ACC-NO: 2003-130885

DERWENT-WEEK: 200410

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TITLE: Operation method for a motor <u>vehicle navigation</u> system, <u>calculates the</u> <u>distance</u> to a decision making node and as soon as a minimum <u>distance</u> is reached a new decision making node is determined

Full Title Citation Front Review Classification Date Reference Claims KMC Draw De Province Claims Cl

DERWENT-ACC-NO: 2002-012497

DERWENT-WEEK: 200253

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TITLE: <u>Navigation</u> with small data quantities involves comparing distance covered between way <u>points</u> with stored distance to output driving notices when difference below minimum value

Full	Title Citation Front I	Review Classification D.	ate Reference	Cla	rims KWC Draw De
	······································		······································		***************************************
	10. Document ID:	JP 2001183152 A			
L4:	Entry 10 of 31	F	ile: DWPI	Ju	11 6, 2001

DERWENT-ACC-NO: 2002-181671

DERWENT-WEEK: 200224

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TITLE: Route display method for vehicle navigation device, involves determining distance of route from starting point to destination and displaying route map with linked external data stored in compact flash memory

Full Title Citation Front Review Classification Date Reference	Claims KMC Draw De
,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
Clear Generate Collection Print Fwd Refs Bi	cwd Refs Generate OACS
Terms	Documents
L2 and ((calculat\$ or determin\$) with distance)	31

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Previous Page Next Page Go to Doc#

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Generate OACS

Search Results - Record(s) 11 through 20 of 31 returned.

11. Document ID: JP 2001108456 A

L4: Entry 11 of 31

File: DWPI

Apr 20, 2001

DERWENT-ACC-NO: 2001-505217

DERWENT-WEEK: 200156

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TITLE: Route planning apparatus for motor <u>vehicles</u>, displays <u>route</u> such that starting and terminus <u>points of route</u> are connected by lines through arbitrary

relay points

DERWENT-ACC-NO: 2001-501701

DERWENT-WEEK: 200155

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TITLE: <u>Vehicle</u> mounted electronic <u>navigation</u> device has processor to define <u>route</u> on common feature, when starting location and <u>destination</u> are within common

feature, else defines <u>route</u> on common link or common network

Full Title Citation Front Review Classification Date Reference Claims KMC Draw Du

13. Document ID: JP 2000275050 A

L4: Entry 13 of 31 File: DWPI Oct 6, 2000

DERWENT-ACC-NO: 2000-668041

DERWENT-WEEK: 200065

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TITLE: Vehicular $\underline{\text{navigation}}$ apparatus has display unit in which scrolling of $\underline{\text{map}}$ is carried out in $\underline{\text{determined}}$ scroll direction for distance lesser than specific value

14. Document ID: JP 2000193476 A

L4: Entry 14 of 31

File: DWPI

Jul 14, 2000

DERWENT-ACC-NO: 2000-508719

DERWENT-WEEK: 200046

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TITLE: Satellite based <u>navigation</u> apparatus for <u>vehicles</u>, computes distance ratio of specific <u>route other than destination route</u> with respect to starting <u>point</u>,

based on which target route is selected

Full	Title Citation Front Review Classification	Date	Reference	Claims	KWMC Diava De
	15. Document ID: US 5964821 A		***************************************		
L4:	Entry 15 of 31	File:	DWPI	Oct 12,	1999

DERWENT-ACC-NO: 1999-618757

DERWENT-WEEK: 199953

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TITLE: Mapless GPS navigation system with sortable destinations for use in

automotive vehicle

Full	Title Citation Front R	eview Classification	Date Reference	Claims	KWIC	Draw, De

	16. Document ID:			***************************************		
L4:	Entry 16 of 31		File: DWPI	Mar 9,	1999	9

DERWENT-ACC-NO: 1999-237737

DERWENT-WEEK: 199920

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TITLE: Route display device for car navigation apparatus - has warning unit that

informs variation of route condition

Full Title Citation Front	Review Classification Date Reference	Claims : KWC : Draw, De
17. Document ID	: JP 09236445 A File: DWPI	Sep 9, 1997

DERWENT-ACC-NO: 1997-499336

DERWENT-WEEK: 199750

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TITLE: <u>Vehicle navigation</u> system e.g. for motor <u>vehicle</u> - in which display unit displays facilities name acquired by acquisition unit when distance between current position and cross point is less than predetermined value

Full Title Citation Front Review Classification Date Reference Claims KMC Drawa Date Reference Claims Claims KMC Drawa Date Claims Clai

DERWENT-ACC-NO: 1997-134318

DERWENT-WEEK: 199714

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TITLE: Directed guiding unit for guiding <u>vehicle to destination - has distance</u> <u>determining</u> device to trigger alarm signal when <u>calculated</u> perpendicular <u>distance</u> exceeds threshold

Full Title | Citation | Front | Review | Classification | Date | Reference | Claims | Claims | KMC | Drawn Department | De

DERWENT-ACC-NO: 1997-055900

DERWENT-WEEK: 200328

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TITLE: <u>Navigation</u> appts. for moving <u>vehicle</u> - has direction <u>destination</u> mark display through which mark that shows <u>destination</u> of moving vehicle is generated

Full Title Citation Front Review Classification Date Reference Claims ROMC - Graw Do

20. Document ID: JP 3460033 B2, JP 08210864 A

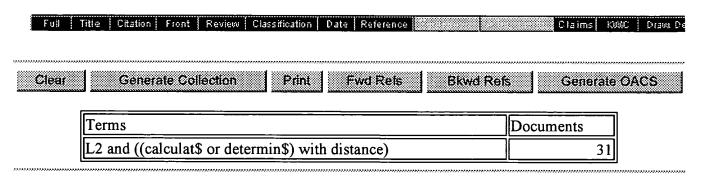
L4: Entry 20 of 31 File: DWPI Oct 27, 2003

DERWENT-ACC-NO: 1996-428499

DERWENT-WEEK: 200373

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TITLE: <u>Vehicle navigation</u> appts - has path guiding unit which guides <u>vehicle</u> in correct path between starting and <u>destination points</u> based on transit position of <u>vehicle and map</u> information from memory



Display Format: - Change Format

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Clear Generate Collection Print Fwd Refs Bkwd Refs
Generate OACS

Search Results - Record(s) 21 through 30 of 31 returned.

21. Document ID: EP 702209 A1, DE 69527121 E, JP 08086659 A, JP 08105754 A, US 5757289 A, JP 3171029 B2, EP 702209 B1

Using default format because multiple data bases are involved.

L4: Entry 21 of 31

File: DWPI

Mar 20, 1996

DERWENT-ACC-NO: 1996-152783

DERWENT-WEEK: 200256

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TITLE: Navigation system esp. for motor $\underline{\text{vehicle}}$ with automatic $\underline{\text{route}}$ re-search on $\underline{\text{route}}$ deviation - when current position deviates from searched $\underline{\text{route}}$, determines whether $\underline{\text{vehicle}}$ has travelled predetermined $\underline{\text{distance}}$ after re-searching, where travel guidance is based on re-searched $\underline{\text{route}}$, or otherwise based on previously searched route

INVENTOR: MAEKAWA, K; NANBA, A; NIMURA, M

PRIORITY-DATA: 1994JP-0264584 (October 3, 1994), 1994JP-0247293 (September 14,

1994)

PATENT-FAMILY:

PUB-NO	PUB-DATE	LANGUAGE	PAGES	MAIN-IPC		
EP 702209 A1	March 20, 1996	E	031	G01C021/20		
DE 69527121 E	July 25, 2002		000	G01C021/20		
JP 08086659 A	April 2, 1996		010	G01C021/00		
JP 08105754 A	April 23, 1996		013	G01C021/00		
US 5757289 A	May 26, 1998		000	G08G001/123		
JP 3171029 B2	May 28, 2001		013	G01C021/00		
EP 702209 B1	June 19, 2002	E	000	G01C021/20		

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Full : Title : Citation : Front	Review Classification Date	
Tun The Change Trong	heaten Classification Date	Reference Claims KWC Draw Da

22. Document ID: JP 08054253 A

L4: Entry 22 of 31

File: DWPI

Feb 27, 1996

DERWENT-ACC-NO: 1996-176336

DERWENT-WEEK: 199618

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TITLE: Motor vehicle navigation apparatus - has display mechanism which display map

h eb bcgbcc e

 $\underline{\text{for destination}}$ of driver based on present position of $\underline{\text{vehicle}}$ to guide driver completely until the reaches destination

Full | Title | Citation | Front | Review | Classification | Date | Reference | Claims | Claims | KWIC | Draw Date |

23. Document ID: JP 07174573 A

L4: Entry 23 of 31 | File: DWPI | Jul 14, 1995

DERWENT-ACC-NO: 1995-277719

DERWENT-WEEK: 199537

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Full Title Citation Front Review Classification Date Reference Claims KWC Draws De Claims Claims

DERWENT-ACC-NO: 1995-091973

DERWENT-WEEK: 200335

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TITLE: Position detection system for movable body - has display unit, <u>map</u> memory, travelled distance detector, mode selector for simulated <u>navigation</u>, simulation position detector and controller

Full Title Citation Front Review Classification Date Reference Classification Date Classification Date Reference Classification Date Cla

DERWENT-ACC-NO: 1995-024347

DERWENT-WEEK: 200253

2271423 B

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TITLE: <u>Vehicle navigation</u> system providing <u>route</u> display to <u>destination</u> - incorporates automatic setting of new target transit <u>point</u> if travel <u>route</u> is changed and original target transit <u>point</u> is not passed

Full | Title | Citation | Front | Review | Classification | Date | Reterence | Claims | Claims | KWIC | Drawl De |

1. 26. Document ID: GB 2271423 A, DE 4334701 C2, DE 4334701 A1, US 5430653 A, GB

h e b b cg b cc e

L4: Entry 26 of 31

File: DWPI

Apr 13, 1994

DERWENT-ACC-NO: 1994-103732

DERWENT-WEEK: 199707

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TITLE: Vehicle navigation display system - has road selector for choosing road to

be taken from base point to intersection and displays route on road map

Full Title Citation Front Review Classification Date Reference

27. Document ID: DE 4327780 A1, JP 3145198 B2, US 5638279 A, DE 4327780 C2, JP 3129846 B2

3129840 BZ

L4: Entry 27 of 31

File: DWPI

Mar 3, 1994

Claims KMC Dram De

DERWENT-ACC-NO: 1994-075864

DERWENT-WEEK: 200116

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TITLE: <u>Vehicle navigation</u> system with display for <u>vehicle</u> position w.r.t. junction

- begins discrete display of position when <u>vehicle</u> is set <u>distance</u> from intersection, and ends display when system <u>determines</u> that crossing has been

accomplished

Full Title Citation Front Review Classification Date Reference Claims KAMC Braw Do

28. Document ID: DE 4035979 A, DE 4035979 C2, FR 2655449 A, GB 2238870 A, GB 2238870 B, US 5206811 A

L4: Entry 28 of 31

File: DWPI

Jun 6, 1991

DERWENT-ACC-NO: 1991-172523

DERWENT-WEEK: 199124

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TITLE: Navigation system for motor $\underline{\text{vehicle}}$ - uses computer with memory $\underline{\text{maps}}$ with system of $\underline{\text{destination points}}$ and data groups to display abstract information

29. Document ID: DE 3719017 A, DE 3874115 G, EP 323485 A, EP 323485 B1, US 4984168 A, WO 8809974 A

L4: Entry 29 of 31

File: DWPI

Dec 15, 1988

DERWENT-ACC-NO: 1988-361657

DERWENT-WEEK: 198851

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TITLE: Travel route determination for land vehicle navigation - determines route

h eb bcgbcc e

between start and <u>destination</u> within stored road system having two planes of different mesh density and zone size

	Full		Title	Citation	Front	Review	Classification	Date	Reference			Claim	s k	CONC	Drat	w De
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			30.	Docur	nent ID	: DE 3	3610251 A,	DE 3	610251	C, US 47	82447 A					
	L4	1:	Enti	су 30	of 31			File	e: DWPI			Oct	9,	198	86	

DERWENT-ACC-NO: 1986-273124

DERWENT-WEEK: 198642

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TITLE: $\underline{\text{Navigation}}$ system for road $\underline{\text{vehicles}}$ - has street $\underline{\text{map}}$ data stored in memory

and accesses by processor with outputs from direction and distance sensors

Full	fitle Citation	Front	Review	Classification	Date	Reference				Claims	KMC	Drawd De
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	L2 and ((calculat\$ or determin\$) with distance)						31					

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Search Results - Record(s) 31 through 31 of 31 returned.

31. Document ID: EP 20939 A, BR 8003955 A, DE 2925656 A, DE 2925656 C

Using default format because multiple data bases are involved.

L4: Entry 31 of 31

File: DWPI

Jan 7, 1981

DERWENT-ACC-NO: 1981-A5762D

DERWENT-WEEK: 198104

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TITLE: Guidance system for road vehicle - uses processor in each vehicle to

calculate route from movement, destination and positional data

INVENTOR: PILSAK, O

PRIORITY-DATA: 1979DE-2925656 (June 26, 1979)

PATENT-FAMILY:

PUB-NO PUB-DATE LANGUAGE PAGES MAIN-IPC EP 20939 A January 7, 1981 000 BR 8003955 A January 13, 1981 000 DE 2925656 A January 15, 1981 000 DE 2925656 C December 3, 1987 000

INT-CL (IPC): G01C 21/14; G05D 1/12; G06F 15/50; G08G 1/09

Full	Title	Citation	Front	Review	Classification	Date	Reference					Claims	Kon	C	Drawu D
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Set	Items Description
S1	50 NAVIGATION AND (EXIT? OR POI OR POINT) AND SEARCH? AND
	TANCE
S2	14 NAVIGATION AND (EXIT? OR POI OR POINT) AND SEARCH? AND
	TANCE AND PD<=030204
S3	4 NAVIGATION AND (EXIT? OR POI OR POINT) AND SEARCH? AND
	TANCE AND DESTINATION
S4	3 RD (unique items)
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4/3,KWIC/1 (Item 1 from file: 8)

DIALOG(R)File 8:Ei Compendex(R)

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03478820 E.I. Monthly No: El9209110389

Title: On performance of path planning algorithms in unknown terrains.

Author: Rao, Nageswara, S. V.

Corporate Source: Old Dominion Univ, Norfolk, VA, USA

Source: ORSA Journal on Computing v 4 n 2 Spring 1992 p 218

Publication Year: 1992

CODEN: OJCOE3 ISSN: 0899-1499

Language: English

Abstract: We consider the problem of planning a collision-free path for a point robot R from its present position to a specified destination position through an unknown terrain, i.e., a terrain whose model is not known a...

...paper, we investigate some trade-offs in the performance of such algorithms in terms of distance traversed, number of sensor operations and computational complexity. These trade-offs accrue as a result of the details of an underlying graph search algorithm, and in this sense are independent of the other properties of the terrain. We...

...each step, and that (c) among a set of implementations that attempt to optimize the distance to the destination, the A* implementation results in minimum number of scan operations. We also present some interesting... Identifiers: SENSOR OPERATIONS; COLLISION FREE PATH; NAVIGATION C GRAPH SEARCH ALGORITHM

4/3,KWIC/2 (Item 2 from file: 8)

DIALOG(R)File 8:Ei Compendex(R)

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02001518 E.I. Monthly No: El8608067887 E.I. Yearly No: El86007250

Title: PROFILE OF DRIVERS' MAP-READING ABILITIES.

Author: Streeter, Lynn A.; Vitello, Diane

Corporate Source: Bell Communications Research, Morristown, NJ, USA

Source: Human Factors v 28 n 2 Apr 1986 p 223-239

Publication Year: 1986

CODEN: HUFAA6 ISSN: 0018-7208

Language: ENGLISH

...Abstract: varying degrees of familiarity with an area were compared with routes generated by standard graph- search procedures. A shortest-path, breadth-first route characterized half of the 'expert' routes, whereas none of the graph- search procedures matched 'intermediate' and 'novice' routes. A good predictor of whether people chose a particular...

...whether the sum of A PLUS B PLUS C (where A equals the straight-line distance from the start to the road, B equals the distance traveled on the road, and C equals the straight-line distance from the departure point on the road to the destination) did not exceed the straight-line distance between start and destination by more than about 20%. (Edited author abstract) 15 refs.

Identifiers: MAP-READING; SURFACE NAVIGATION

4/3,KWIC/3 (Item 1 from file: 95)

DIALOG(R)File 95:TEME-Technology & Management (c) 2004 FIZ TECHNIK. All rts. reserv.

00703978 193068944927

Two-dimensional robot navigation among unknown stationary polygonal obstacles

(Orientierung eines zweidimensionalen Roboters zwischen unbekannten, stationaeren polygonalen Hindernissen)

Foux, G; Heymann, M; Bruckstein, A

Dept. of Comput. Sci., Technion-Israel Inst. of Technol., Haifa, Israel IEEE Transactions on Robotics and Automation, v9, n1, pp96-102, 1993

Document type: journal article Language: English

Record type: Abstract ISSN: 1042-296X

Two-dimensional robot navigation among unknown stationary polygonal obstacles

ABSTRACT:

...all of which are initially unknown to the robot. The environment is learned during the navigation process by use of a laser range-finding device, and new knowledge is integrated with...

...a new set of expanded polygonal obstacles, allowing the robot to be treated as a point, and the navigation problem is reduced to point navigation among unknown polygonal obstacles. A navigation graph is built from the transformed obstacles and used to search for a piecewise linear path to the destination. The algorithm is proved to converge to the desired destination in a finite number of steps provided a path to the destination exists.

...DESCRIPTORS: ARTIFICIAL INTELLIGENCE; ORIENTATION; DISTANCE MEASUREMENT; LASER APPLICATIONS; CURVES...
IDENTIFIERS: OBSTACLE AVOIDANCE; UNKNOWN STATIONARY POLYGONA LASER RANGE FINDING DEVICE; NAVIGATION GRAPH; PIECEWISE LINEAR zweidimensionaler Roboter; Navigation?

3 of 3

4/7/2 (Item 2 from file: 8)

DIALOG(R)File 8:Ei Compendex(R)

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02001518 E.I. Monthly No: El8608067887 E.I. Yearly No: El86007250

Title: PROFILE OF DRIVERS' MAP-READING ABILITIES.

Author: Streeter, Lynn A.; Vitello, Diane

Corporate Source: Bell Communications Research, Morristown, NJ, USA

Source: Human Factors v 28 n 2 Apr 1986 p 223-239

Publication Year: 1986

CODEN: HUFAA6 ISSN: 0018-7208

Language: ENGLISH

Document Type: JA; (Journal Article) Treatment: A; (Applications); X;

(Experimental)

Journal Announcement: 8608

Abstract: Self-described good navigators like and use maps, and they differentially value landmarks, such as rivers, railroads, and houses, whereas poor navigators tend not to use maps, prefer verbal instructions, and tend to rate all landmarks as equally valuable for route finding. Routes selected by people with varying degrees of familiarity with an area were compared with routes generated by standard graph-search procedures. A shortest-path, breadth-first route characterized half of the 'expert' routes, whereas none of the graph-search procedures matched 'intermediate' and 'novice' routes. A good predictor of whether people chose a particular road was whether the sum of A PLUS B PLUS C (where A equals the straight-line distance from the start to the road, B equals the distance traveled on the road, and C equals the straight-line distance from the departure point on the road to the destination) did not exceed the straight-line distance between start and destination by more than about 20%. (Edited author abstract) 15 refs.

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